

# Heavy Substance Use Among California Students

Results of the 2003/04  
Biennial California Student Survey

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# Heavy User Report

- The scope and nature of High Rate Drug Use (HRU) and Binge Drinking (BNG) based on 2003 California Student Survey (CSS) data.
- The extent to HRU/BNG define heavy, problematic users in need of intervention
- Involvement in school and other problem behaviors
- Response to prevention and school policies
- Overall size of the intervention population
- Implications for school counseling, prevention, and academic improvement

# What is the CSS?

- Biennial survey of AOD use and other risk behaviors among California secondary students, since 1985
- Legislatively mandated since 1991
- Under the direction of the Office of the Attorney General and co-sponsored by the Dept. of Alcohol and Drug Programs and the California Dept. of Education.
- Controlled administration (by contractor)
- Representative state sample; random schools/classrooms
- Source of items on the California Healthy Kids Survey
- Fully integrated with the CHKS in 1999 (aka “The biennial statewide CHKS”), to provide state norms for local comparison)

## High Rate Use of Drugs (HRU)

- Based on number, type, and frequency of illicit drug use *in past six months*:
  - Regular marijuana or polydrug use (weekly or more frequent)
  - Any cocaine use
  - Use of numerous other drugs or high frequency of individual drugs
  - Any alcohol use (as control)
- Comparison to:
  - Conventional Drug Users — used drugs but not meet HRU criteria
  - Abstainers — no use of drugs *or alcohol*

## Binge Drinking (BNG)

- In ***past 30 days***, consumed five or more drinks in a row (within couple of hours) at least one day
- Comparison to:
  - Nondrinkers — no alcohol in the past 30 days
  - Nonbinge drinkers — drank alcohol but didn't binge
  - Regular binge drinkers — binged 3 or more of past 30 days
- Shorter time frame and restriction of nonuse to only alcohol (vs. any AOD use for HRU) make group differences less pronounced than between drug-use groups.

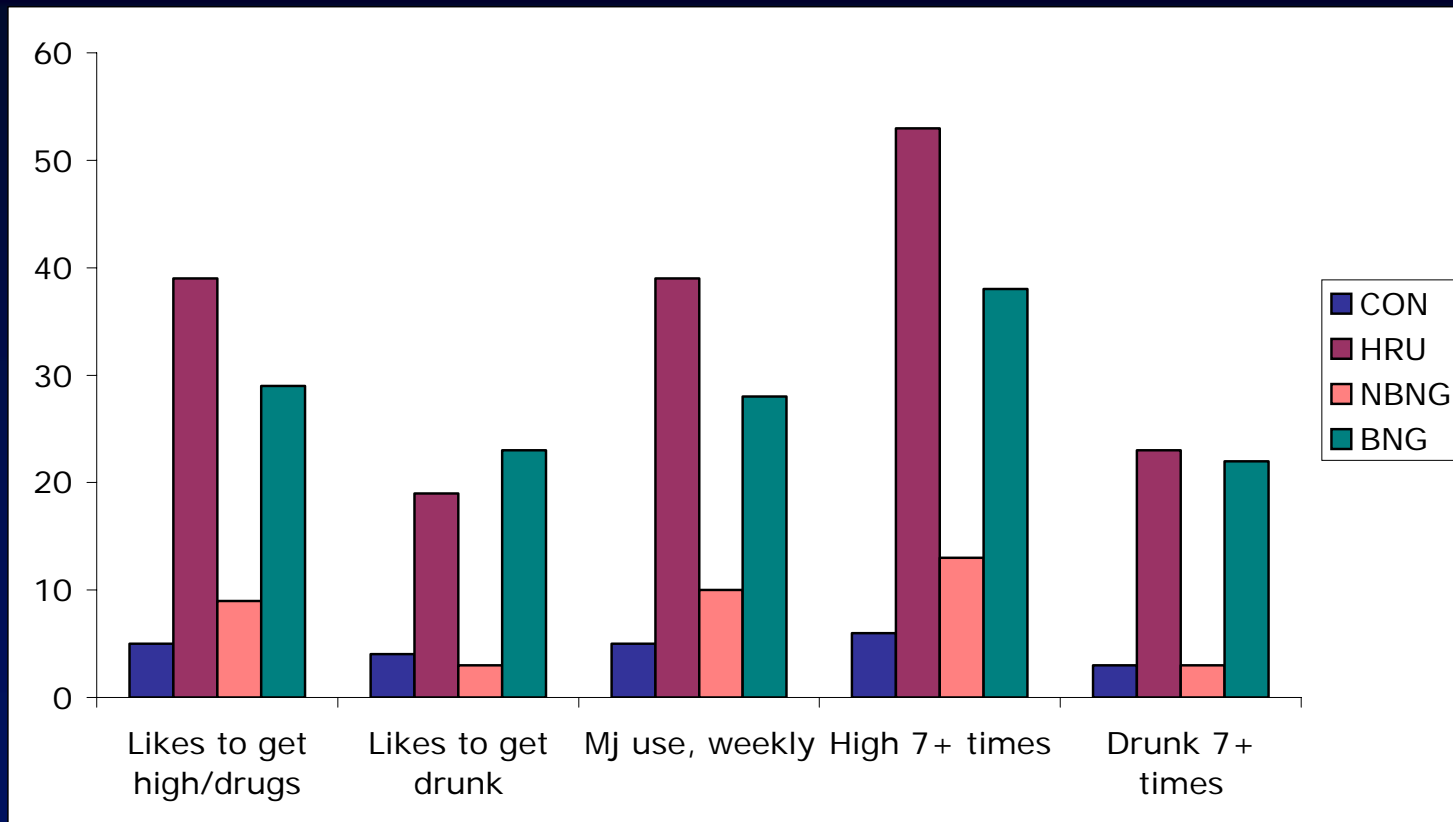
## Grade Level Considerations

- HRU/BNG doubles between 9th and 11th grade. Occasional use remains relatively level.
- By 11th grade, binge drinking is the predominant pattern of alcohol consumption.
- On most indicators of heavy use and problems, 9th grade HRU/BNG are equivalent to, and often higher than, 11th graders. They are already on a trajectory of abuse and dependence.  
We should focus on 9th graders to understand how to break that trajectory

## Levels of Use

	9 <sup>th</sup>	11 <sup>th</sup>
Drug Use Past 6 Months		
AOD Abstainer (ABS)	50	35
Conventional User (CON)	41	47
High Rate User (HRU)	9	17
Current Alcohol Use (30 Days)		
Nondrinker (NALC)	75	63
Nonbinge drinker (NBNG)	13	14
Binge Drinker (BNG)	12	23
Regular Binge Drinker, 3+ days (RBNG)	5	12
HRU or BNG	18	30
HRU and BNG	5	11

# Heavy Drug Use Indicators

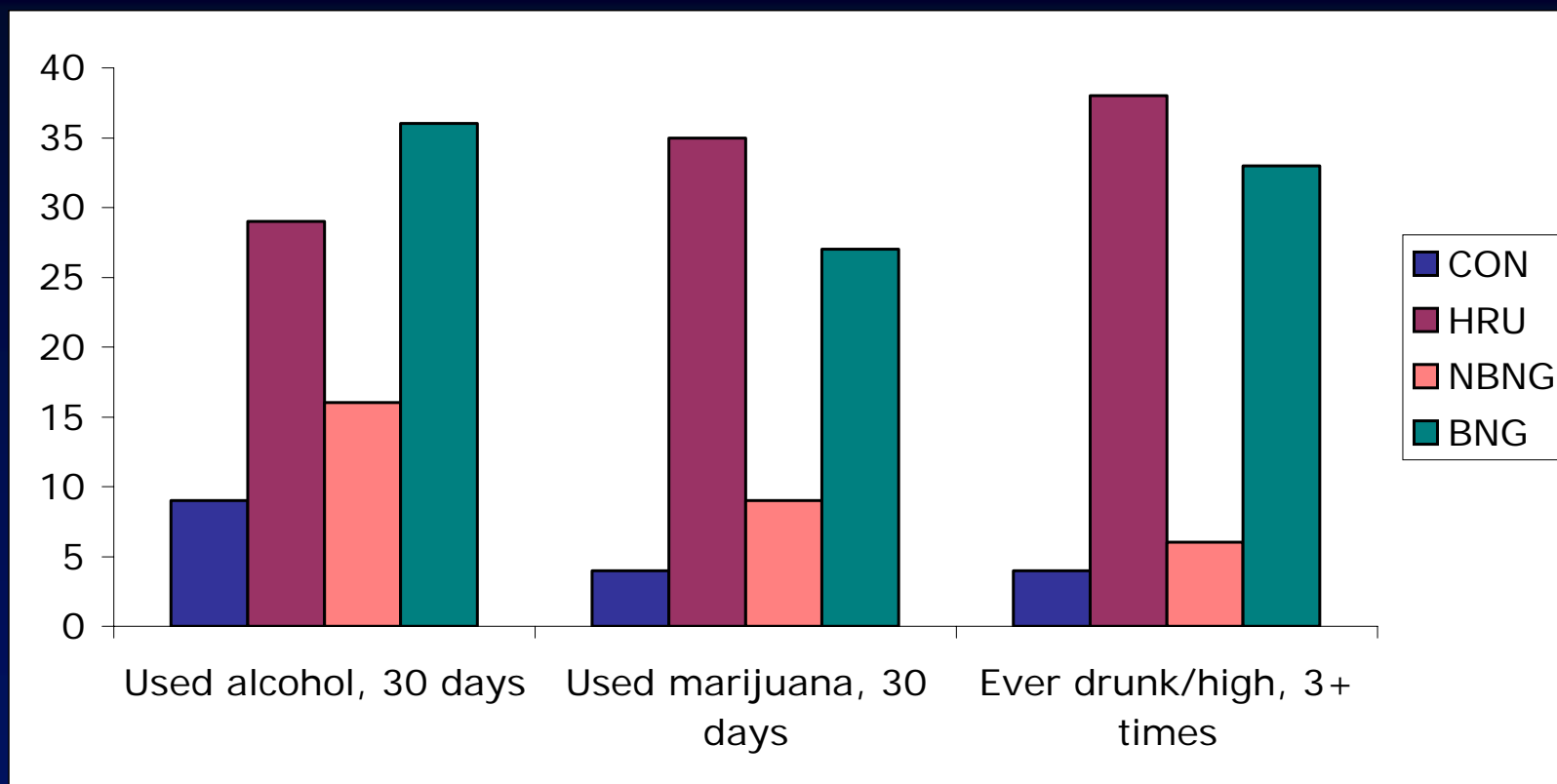


9th Grade

HRU = High Rate Drug Use. BNG = Binge Drinker. Weekly marijuana use = 3 out of past 30 days; polydrug use, past six months

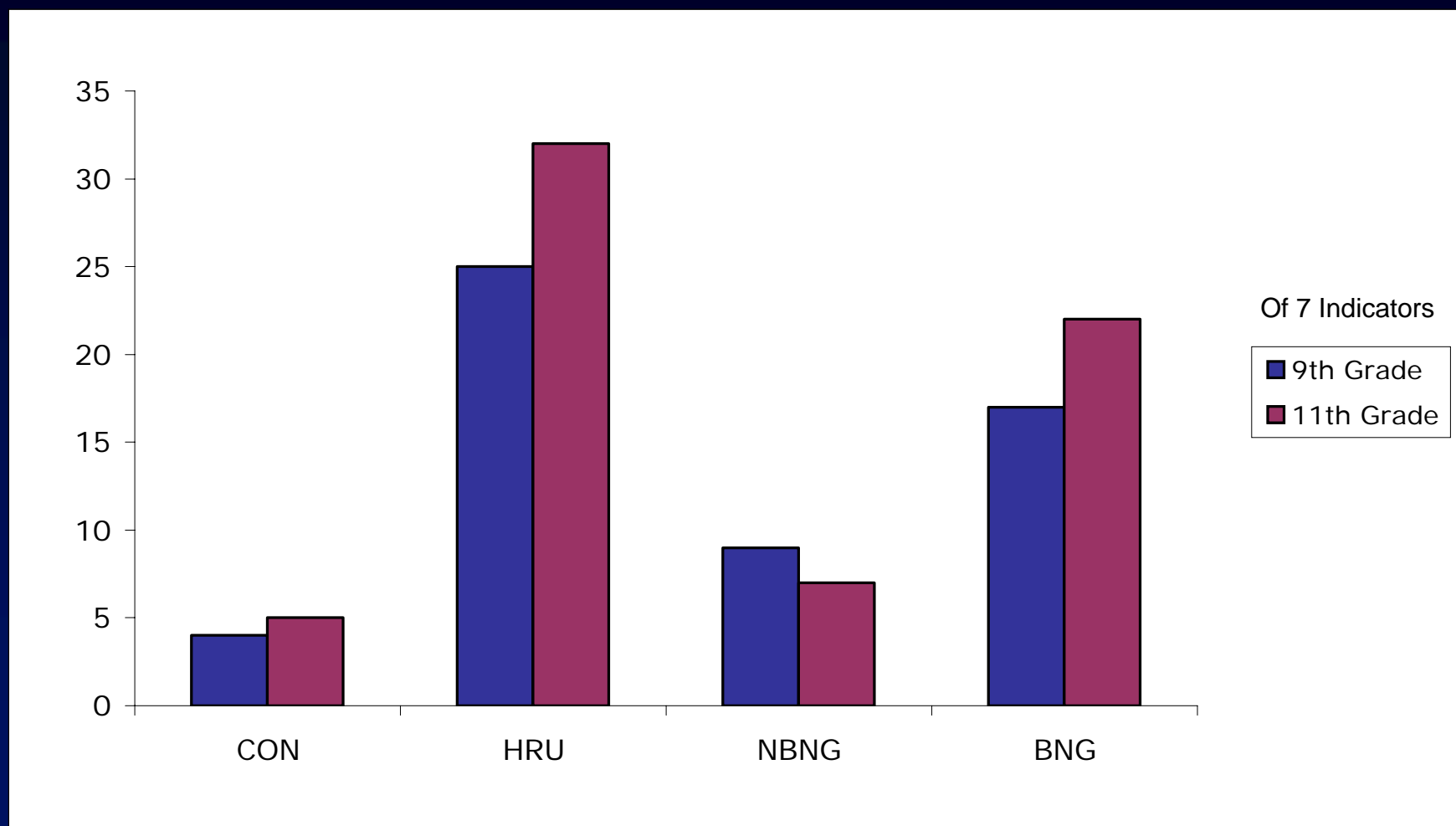


## AOD Use at School



9th Grade

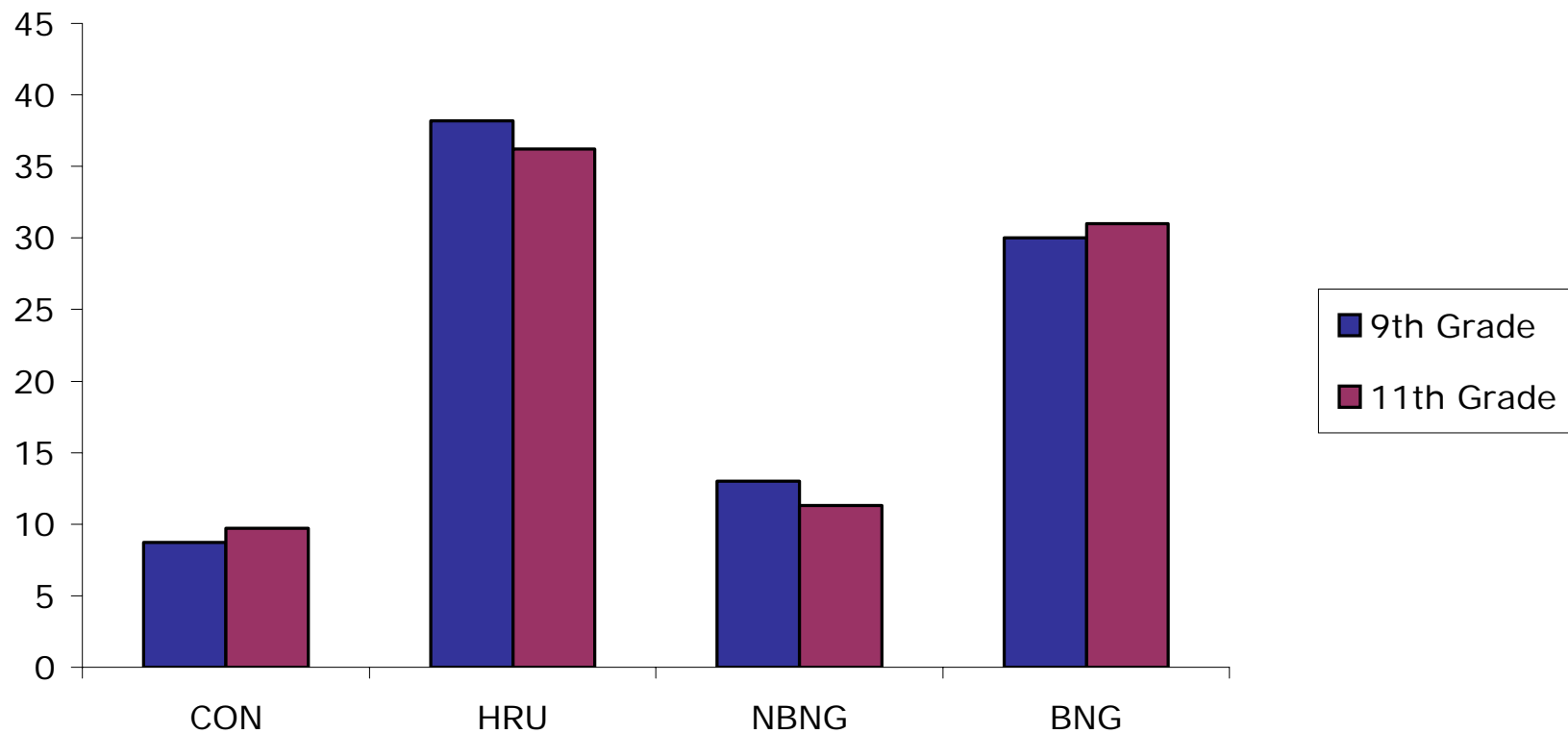
## 3 or More of 7 Dependency Indicators



\*Based on DSM-IV Substance Use Dependency diagnostic criteria

HRU = High Rate Drug Use. CON = Conventional Drug Use (past 6 months) BNG = Binge Drinker. NBNG = Nonbinge drinkers

## 3 or More of 11 Use Problem Indicators



\*Based on DSM-IV Substance Use Dependency diagnostic criteria

HRU = High Risk Drug Use. CON = Conventional Drug Use (past 6 months) BNG = Binge Drinker. NBNG = Nonbinge drinkers

# Size of Overall “Intervention Need”

## Typical Criteria

- Problematic or risky patterns of use (e.g., HRU/BNG)
- Use-related problems
- Dependency indicators
- Cessation efforts

## Issues

- No right method or cut-off point.
- One factor alone should not qualify.
- Looked for consistency across methods.

# Summary of Intervention Estimates

## Potential Intervention Need:

- 9th: 7-10%
- 11th: 13-18%

## Treatment Need Subgroup:

- 9th: 4-5%
- 11th: 8-9%

In an average 11th-grade classroom of 35 students:  
5-6 students may be in need of some intervention;  
3 for treatment or counseling

## DSM-IV Dependency Criteria: 3 of 6

- Evidence of Tolerance to Use [1 question]
- Lack of Use Control [1 of 2 questions]
- Time-consuming Substance Use Lifestyle [1 question]
- Important Activities Given Up/Reduced [1 question]
- Persistent or Recurrent Physical or Psychological Problems [1 of 2 questions]
- Use Cessation or Reduction Efforts [1 of 4 questions, including 2 or more efforts to stop use]

\* Similar method used by National Survey of Drug Use and Health

## DSM-IV Substance Abuse Criteria

Doesn't meet dependency criteria but has recurrent use with at least one of the following.

- Failure to fulfill major role obligations (work, school) [2 of 7 items]
- Use in situations which physically hazardous (DUI) [2+ of 4 items]
- Related legal problems [1 item]
- Persistent/recurrent social or interpersonal problems caused or exacerbated by use [1+ of 2 items]

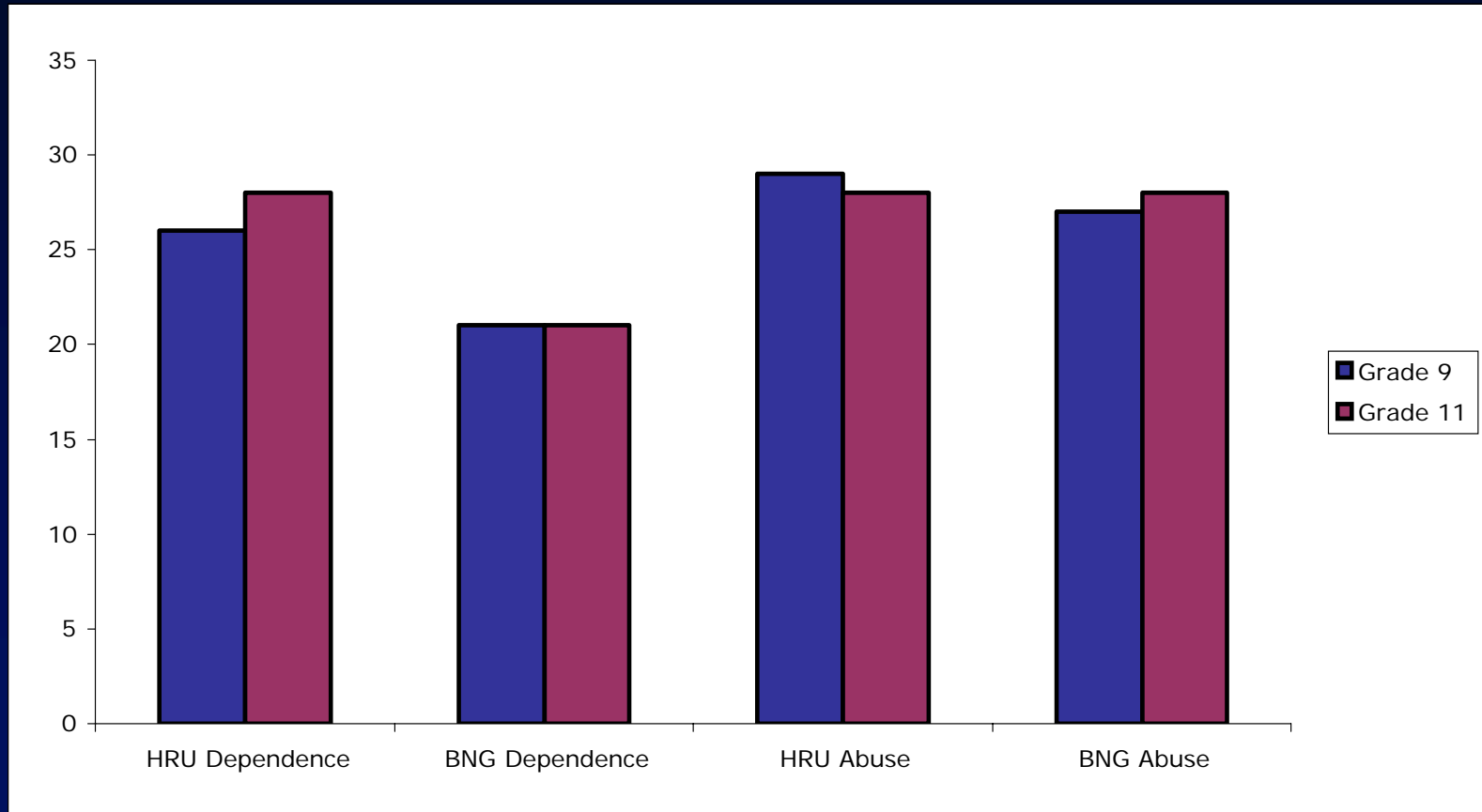
For recurrent use control, any AOD use in the past month.

# Analysis Using DSM Criteria

CSS	9 <sup>th</sup>	11 <sup>th</sup>
DSM dependency	4.3	8.4
DSM abuse	6.0	10.0
DSM dependency or abuse (Total)	10.3	18.4
Natl Survey Drug Use and Health (2003) (14 & 16 year olds)		
DSM dependency	2.6	7.0
DSM abuse	4.4	9.1
DSM dependency OR abuse (Total)	6.7	14.6



# HRU/BNG Intervention Need Based on DSM Criteria



HRU = High Risk Drug Use. ABS = Total Abstainer (past 6 months)  
BNG = Binge Drinker.

# Characteristics of HRU/BNG

## Young Females are at High Risk

Compared to males, in 9th-grade females were:

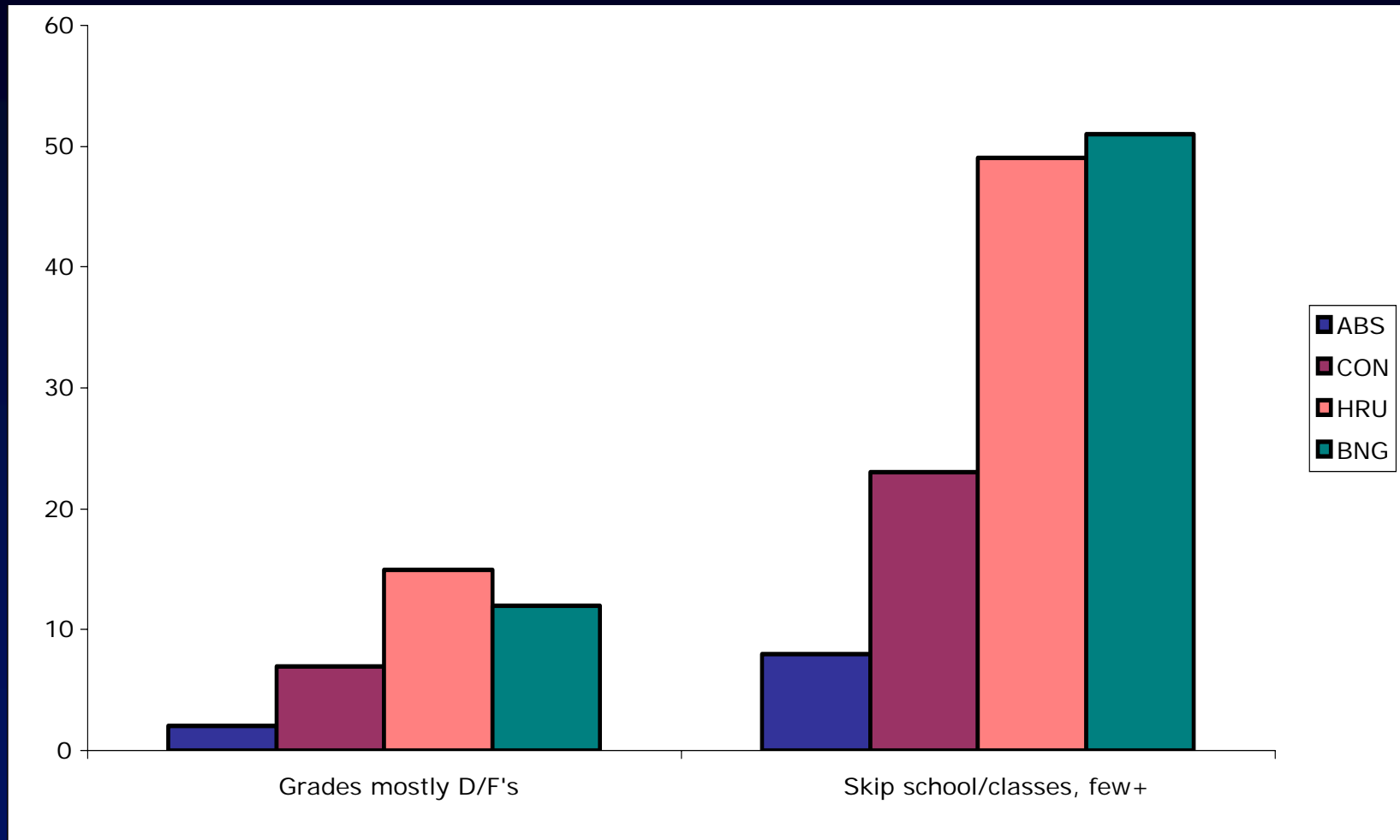
- Similar in HRU rate & 1.5 times higher BNG (14% v. 9%).
- 3 times more likely to have passed out from alcohol.
- 1.5-2 times as likely to report two or more problems from alcohol and drugs.
- 2+ times as likely to report 2 or more dependency indicators.

Similar results found by the Columbia Center for Addiction and Substance Abuse

## Problems not Limited to AOD Use

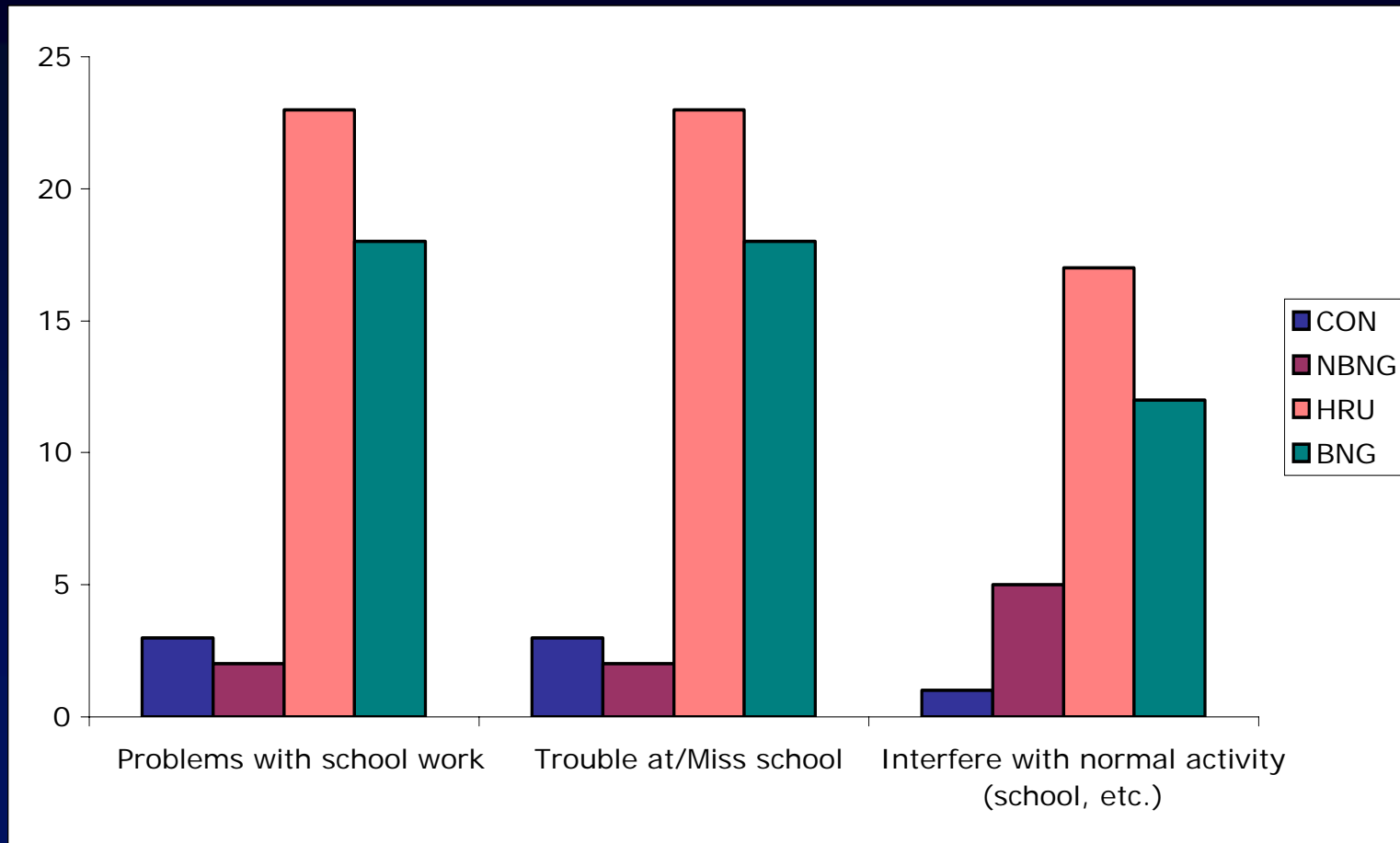
- Other problems increase stepwise across AOD groups.
- Heavy Users are more likely to report:
  - Indication of depression
  - Violence, weapon possession, & gang membership
  - School problems (attendance, grades, connectedness)
  - Victimization and harassment (to lesser extent)
  - Feeling unsafe at school
- 9th grade rates similar to 11th

## More Likely to Perform Poorly and Skip School



9th Graders

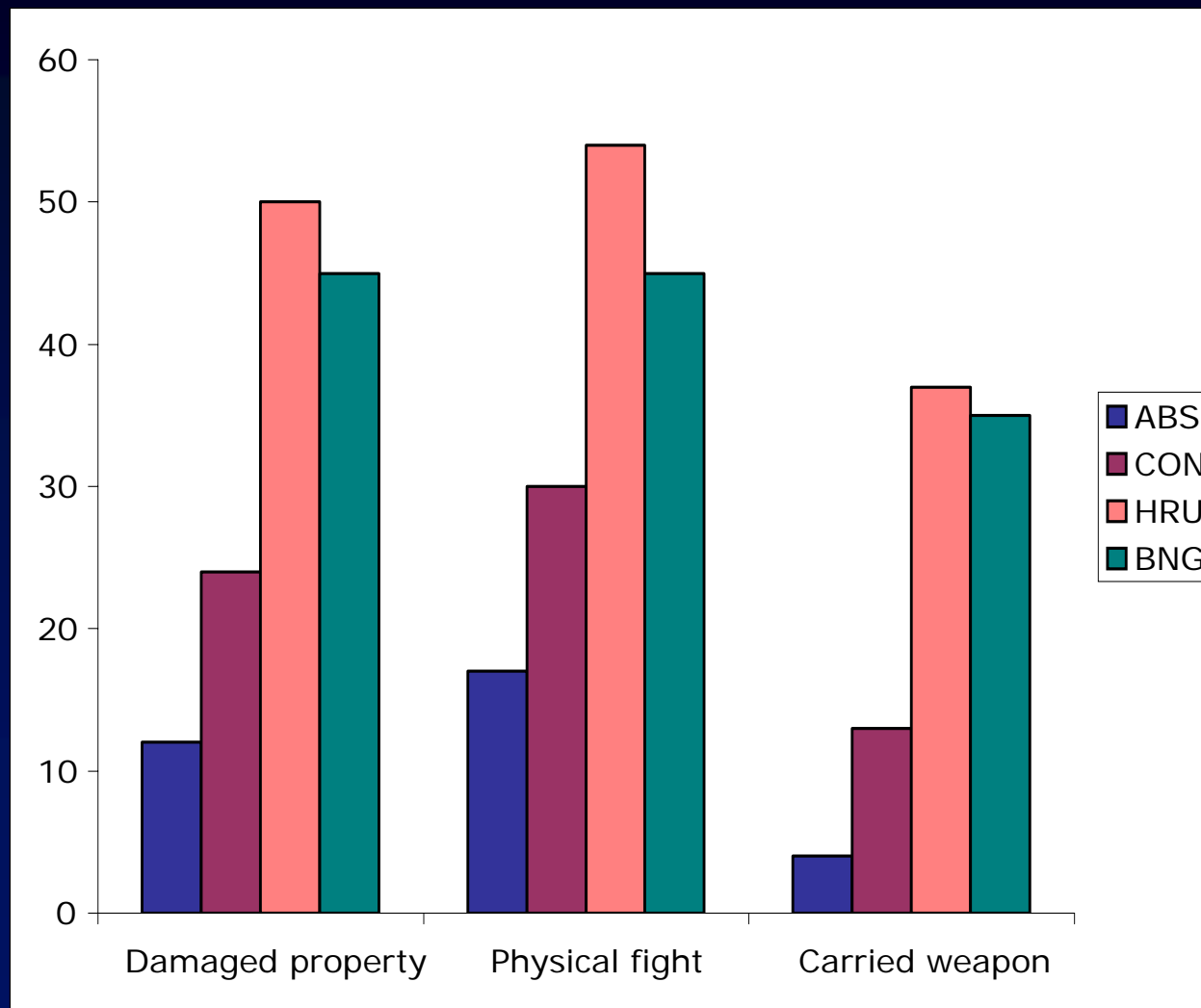
# More School Problems from AOD Use



9th Graders

HRU = High Rate Drug Use. CON = Conventional Drug Use (past 6 months)  
BNG = Binge Drinker. NBNG = Nonbinge drinkers (past 30 days)

# Engage in More Violence at School



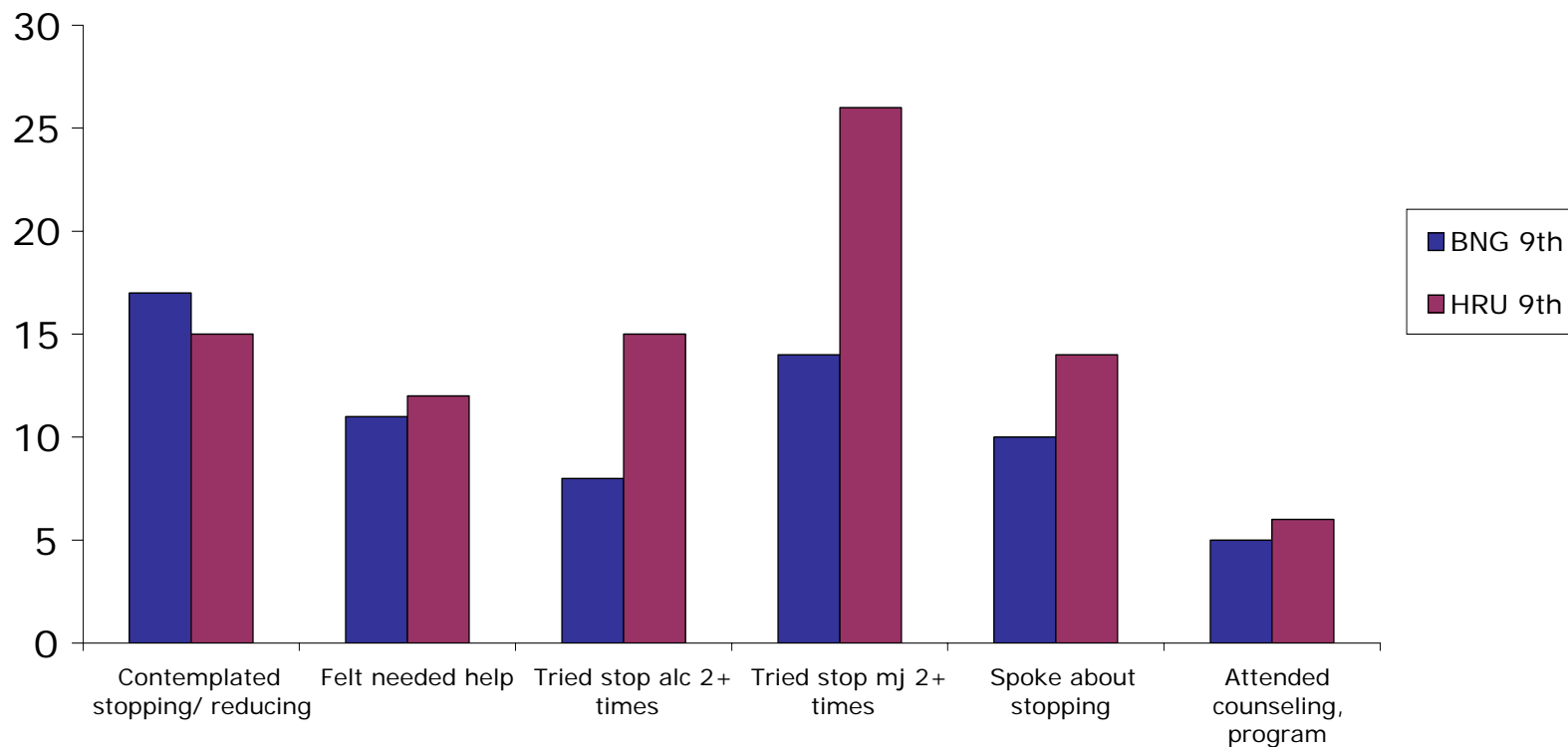
9th Graders — Past 12 Months

## Not Reached by Prevention

- Heavy, occasional, and nonusers all report ***equivalent exposure to drug lessons***
- Heavy users 2 times as likely as occasional users, and 4 times nonusers, to report ***not learning anything***
- Half as likely as nonusers to report receiving typical lessons about avoiding AOD use, use harm, and peer resistance.

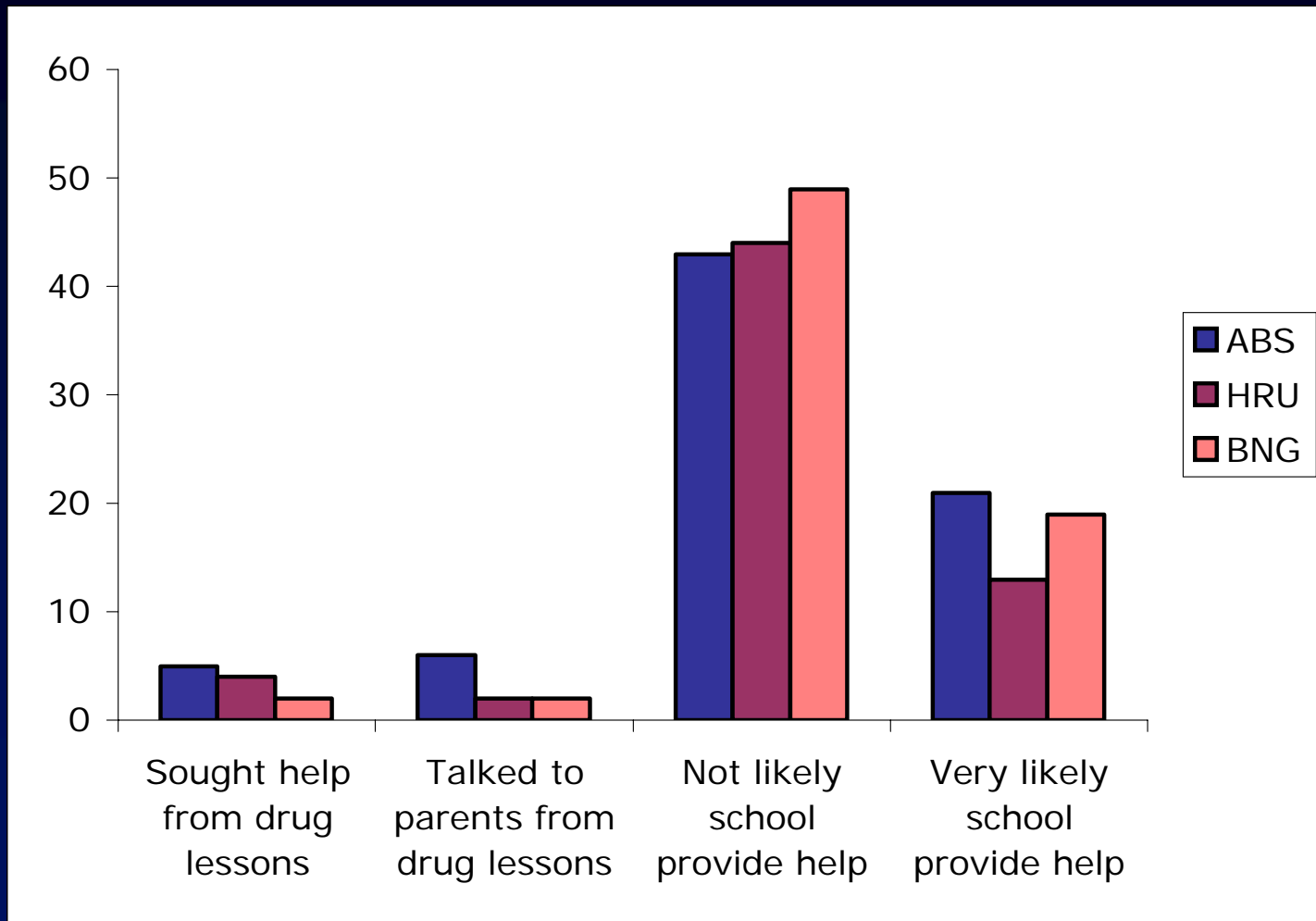


## More likely to Contemplate than Seek Help — especially for alcohol use



Consistent with intervention need estimates

## School Help Seen as Limited



9th Graders

# Summary

- High Rate Use of Drugs Index and Binge Drinking are good indicators of heavy use
- An unacceptably high proportion of 9th and 11th graders are at risk of abuse and dependency.
  - One tenth of 9th graders and one sixth of 11th may be in need of some form of intervention, half of these for treatment.
- Social costs heavily concentrated among the HRU/BNG, which constitute 30% of 11th graders.
- Binge drinking an equally if not more serious problem as drug abuse, and more difficult to address.
- Clear association between level of use and school problems, violence, poor mental health.

# Implications: School Improvement

Efforts to improve academic performance and schools will be limited without addressing high levels of substance use associated with poor performance, attendance, behavior, and engagement.

- One explanation for why problem rates are similar in 9th and 11th grades, even though heavy use increases, is high rates of dropping out of school among HRU/BNG.

## Reducing abuse may significantly improve the learning environment for all students

9% of 9th-graders, HRU are responsible for:

- 21% of school fighting,
- 24%-27% of school vandalism, D/F's, and chronic truancy (once a month or more),
- 34% of weapons possession.

18% of 9th-graders, HRU *or* BNG are responsible for:

- About 30% of fighting and vandalism.
- About 40% of chronic truancy, D/F's, and weapons possession.

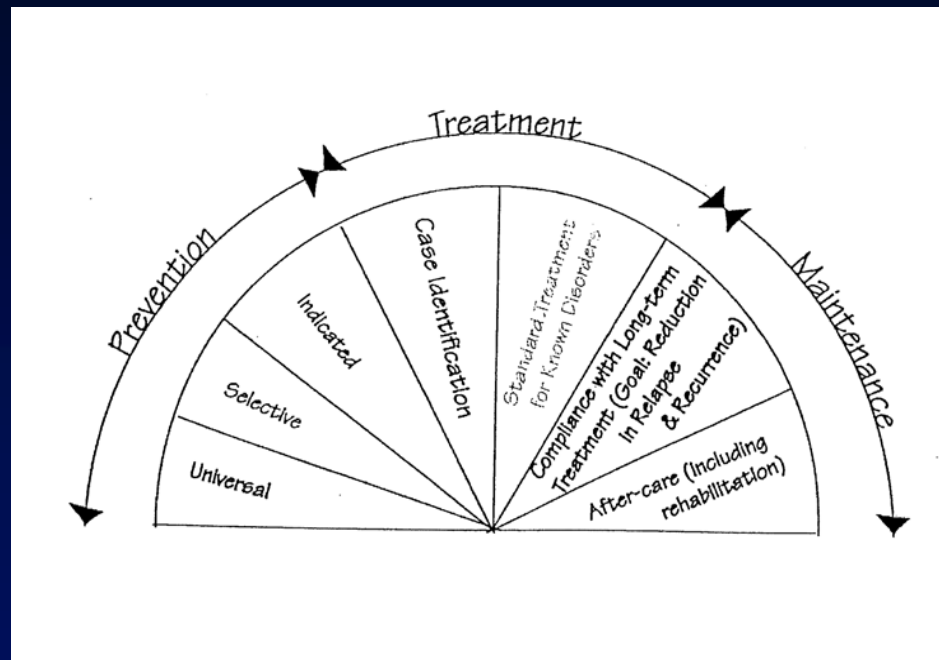
# Expand School-based Interventions

School-based intervention efforts, such as Student Assistance Programs (SAP's), link school and community resources to:

- Identify problem users and at-risk youth
- Provide **support** and a continuum of services, including referral to treatment, to help prevent, stop, or reduce AOD use.
- Address the school, social, personal, and behavioral problems associated with AOD use.

# What Do We Mean by Intervention?

## The Institute of Medicine Substance Use Service Model



Interventions fall within *Selected* (targeting at risk groups) and *Indicated* (targeting symptomatic individuals) service levels

# The Need for SAP's

- Most high schools do not provide intervention services, consistent with CSS student perceptions.
  - 535 of 1,298 districts report having SAP's, but not clear what is provided and in how many schools.
- Development of SAP's is hampered by lack of funding, staff expertise, school buy-in (priorities)
- Many California counties have few if any early intervention programs (Schwab Foundation Report on Adolescent Treatment)



# The Need for SAP's

- The number-one source of referrals to adolescent drug treatment programs in the United States is the juvenile justice system.
  - From 67% to four-out-of-five youth involved in the juvenile justice system have a pre-existing substance use problem.
- We need to break the escalation of problems that leads heavy users to drop out of school and into the criminal justice system before they receive help.
- For many youth, school is the only place in which concerned adults can identify and actively address the issues that interfere with positive development.

# Intervention Strategies

- Begin at least in Middle School. Heavy users in 9<sup>th</sup> grade already on a trajectory to dependence and other problems likely contributing to school failure.
- Do AOD assessments on youth with severe school behavioral and academic problems.
- Be prepared to deal with a wide range of other, interrelated problems and risk behaviors.
- Develop female-specific intervention strategies

# The Need for Treatment Services

For SAP's to work, treatment needs to be available for referral.

- Many counties have sparse outpatient care sites for youth, no intensive outpatient or day treatment, no publicly funded detoxification or crisis intervention, and no local residential treatment for those unable to remain at home.
- Nationally, treatment reaches only 20% of adolescents with substance use disorders and only 25% of them receive enough.
- Even within the juvenile justice system, fewer than 20% in need have access to treatment.

—Schwab Foundation Report

# Conclusion

- Our institutions are failing too many vulnerable youth in need for help for substance use and related school and other problems.
- Reducing heavy use should help improve school performance, attendance, safety, and the overall learning environment.